State of West Virginia Department of Environmental Protection - Office of Oil and Gas Well Operator's Report of Well Work

API	47	County	Γ	District	
Quad		Pad Name	F	Field/Pool Name	
Farm nar	me			Well Number	
Operator	(as registered with the O	OG)			
Address		City		State	Zip
	ed location NAD 83/U7 Top hole Landing Point of Curve Bottom Hole	Northing	Eastin	ng ng	
Elevation	n (ft) C	GL Type of Well	New □ Existing	Type of Report	□Interim □Final
Permit T	ype □ Deviated □	Horizontal Horizontal	al 6A	Depth Type	□ Deep □ Shallow
Type of 0	Operation Convert	□ Deepen □ Drill □	Plug Back □ Redrill	ing □ Rework	□ Stimulate
Well Typ	pe 🗆 Brine Disposal 🗆 🔾	CBM □ Gas □ Oil □ Seco	ondary Recovery	ution Mining 🗆 St	torage Other
• •	Completion □ Single □ with □ Cable □ Rotar	Multiple Fluids Produc	ed □ Brine □Gas	□ NGL □ Oil	□ Other
Production		□ Air □ Mud □Fresh Water □ Brine	er Intermediate ho	ole □ Air □ Muo	d □ Fresh Water □ Brine
Data nam	mit inquad	Data deilling gamma	amaa d	Doto deilling	aggrad
=		Date drining comm		_	ceased
		Date permission granted			
Please no	ote: Operator is required	to submit a plugging applica	tion within 5 days of ve	rbal permission to p	plug
Freshwat	ter depth(s) ft		Open mine(s) (Y/N) de	pths	
Salt wate	er depth(s) ft				
Coal dep	oth(s) ft		Cavern(s) encountered	(Y/N) depths	
Is coal be	eing mined in area (Y/N)				Reviewed by:

API 47										
CASING	Hole	Casing	1	New or Grac	le B	asket D	Did cement circulate (Y/N)			
STRINGS	Size	Size	Depth	Used wt/f	t De	epth(s) *	Provide details below*			
Conductor										
Surface										
Coal										
Intermediate 1										
Intermediate 2										
Intermediate 3										
Production										
Tubing										
Packer type and do	epth set									
Comment Details										
CEMENT DATA	Class/Type of Cement	Number of Sacks	Slurry wt (ppg)	Yield (ft ³ /sks)	Volume $(ft^{\frac{3}{2}})$	Cement Top (MD)	WOC (hrs)			
Conductor										
Surface										
Coal										
Intermediate 1										
Intermediate 2										
Intermediate 3										
Production										
Tubing										
Drillers TD (ft)		Ţ	oggers TD (ft) _						
				lug back to (ft)						
				148 04011 10 (11)						
Kick off depth	(ft)									
Check all wire	line logs run	•	2	☐ deviated/direct		luction uperature	sonic			
Well cored	Yes □ No	□ Conventional	□ Sidewal	1	Were cuttings of	collected \square Ye	es □ No			
DESCRIBE T	HE CENTD AT I	ZED DI ACEMEN'	L LIGED EOD E	EACH CASING	STRING					
—————		ZERT LACEMEN								
WAS WELL O	COMPLETED A	S SHOT HOLE	□ Yes □ No	o DETAILS	S					
WAS WELL O	COMPLETED O	PEN HOLE?	Yes □ No	DETAILS						
WEDE TD AC	EDCHCED -	Vac - No 7	TVDE OF TD A	CED(C) LICED						

API 47 Farm name Well number

PERFORATION RECORD

Stage No.	Perforation date	Perforated from MD ft.	Perforated to MD ft.	Number of Perforations	Formation(s)

Please insert additional pages as applicable.

STIMULATION INFORMATION PER STAGE

Complete a separate record for each stimulation stage.

Stage No.	Stimulations Date	Ave Pump Rate (BPM)	Ave Treatment Pressure (PSI)	Max Breakdown Pressure (PSI)	ISIP (PSI)	Amount of Proppant (lbs)	Amount of Water (bbls)	Amount of Nitrogen/other (units)

Please insert additional pages as applicable.

API 47		Farm	name			Well number		
PRODUCING :	FORMATION	<u>(S)</u>	<u>DEPTHS</u>					
				_ TVD		MD		
								
Please insert ad	ditional pages	as applicable.						
GAS TEST	□ Build up	□ Drawdown	□ Open Flow	(OIL TEST	Flow □ Pump		
SHUT-IN PRE	SSURE Sur	face	_psi Botto	m Hole	psi	DURATION C	F TEST	hrs
OPEN FLOW	Gas	Oil	NGL		Water	GAS MEASU	RED BY	
	mc	fpd1	opd	_ bpd	bpd bpd	□ Estimated	□ Orifice	□ Pilot
LITHOLOGY/	TOP	ВОТТОМ	TOP	воттом				
FORMATION	DEPTH IN FT	DEPTH IN FT	DEPTH IN FT	DEPTH IN F	T DESCRIBE	ROCK TYPE AND	RECORD QUA	NTITYAND
	NAME TVD	TVD	MD	MD	TYPE OF F	LUID (FRESHWAT	ER, BRINE, OI	L, GAS, H ₂ S, ETC)
	0		0					
Please insert ad	ditional pages							
Drilling Contra	ctor							
Address	mcfpd bpd bpd bpd Estimated Orifice Pilot ITHOLOGY/ TOP BOTTOM ORMATION DEPTH IN FT DEPTH IN FT DEPTH IN FT DESCRIBE ROCK TYPE AND RECORD QUANTITY AND							
Logging Comp	anv							
						State	Zip	
Cementing Cor	nnany							
Address						State	Zip	
							•	
					-	State	Zip	
							r	
Completed 1					Tolomber			

LATERAL WELLBORE

Maximum TVD of wellbore: 6413 ft TVD @ 12116 ft MD

Formation/Lithology	Top Depth, MD (ft)	Top Depth, TVD (ft)	Bottom Depth, MD (ft)	Bottom Depth, TVD (ft)	
SLTSTNE/SS	0	0	330	330	
SLTSTNE	330	330	450	450	
SLTSTNE/SS	450	450	630	630	
SLTSTNE/LS	630	630	660	660	
SLTSTNE/SS	660	660	720	720	
SLTSTNE/LS	720	720	760	760	
PITTSBURGH COAL	760	760	764	764	
SLTSTNE/LS	764	764	810	810	
SHALE/SLTSTNE	810	810	900	900	
SS/SHALE	900	900	920	920	
SHALE	920	920	1050	1050	
SS/SHALE	1050	1050	1110	1110	
SHALE/SLTSTNE	1110	1110	1200	1200	
SHALE/SS	1200	1200	1290	1290	
SHALE	1290	1290	1350	1350	
SHALE/SS	1350	1350	1410	1410	
SS/SHALE	1410	1410	1680	1680	
SHALE	1680	1680	1740	1740	
SHALE/SS	1740	1740	1828	1828	
BIG INJUN	1828	1828	2000	2000	
SHALE	2000	2000	6231	6231	
GENESEO	6230	6181	6250	6195	
TULLY	6250	6195	6309	6235	
HAMILTON	6309	6235	6506	6325	
MARCELLUS	6506	6325	12736	6407	
TD	12736	6407		0	

PERFORATION RECORD ATTACHMENT

Well Name and Number: David Reinbeau MSH 8H API No. 47-051-01622

	PERFORATION RECORD				STIMULATION RECORD							
Stage	Date	Interval Perforated		Total Number				Flu	uid	Propping Agent		Average
		From	То	Of Shots	Date		erval eated	Туре	Amount	Туре	Amount	Injection Rate
1	12/17/2013	12317	12535	40	12/17/2013	12317	12535	SLK Wtr	4247	Sand	347640	84
2	12/17/2013	12080	12298	40	12/17/2013	12080	12298	SLK Wtr	4205	Sand	374820	86
3	12/17/2013	11809	12026	40	12/17/2013	11809	12026	SLK Wtr	4331	Sand	367240	86
4	12/17/2013	11537	11755	40	12/17/2013	11537	11755	SLK Wtr	4438	Sand	378180	85
5	12/18/2013	11266	11483	40	12/18/2013	11266	11483	SLK Wtr	4307	Sand	375080	86
6	12/18/2013	10994	11212	40	12/18/2013	10994	11212	SLK Wtr	4270	Sand	375980	86
7	12/18/2013	10723	10940	40	12/18/2013	10723	10940	SLK Wtr	4313	Sand	374446	85
8	12/19/2013	10451	10669	40	12/19/2013	10451	10669	SLK Wtr	4921	Sand	374540	85
9	12/19/2013	10180	10397	40	12/19/2013	10180	10397	SLK Wtr	4809	Sand	331496	85
10	12/19/2013	9908	10126	40	12/19/2013	9908	10126	SLK Wtr	4750	Sand	374200	85
11	12/19/2013	9637	9854	40	12/19/2013	9637	9854	SLK Wtr	5364	Sand	373200	85
12	12/20/2013	9365	9583	40	12/20/2013	9365	9583	SLK Wtr	4771	Sand	375360	85
13	12/20/2013	9094	9311	40	12/20/2013	9094	9311	SLK Wtr	4784	Sand	374920	85
14	12/20/2013	8822	9040	40	12/20/2013	8822	9040	SLK Wtr	4829	Sand	370820	85
15	12/21/2013	8551	8768	40	12/21/2013	8551	8768	SLK Wtr	6778	Sand	375140	61
16	12/21/2013	8279	8497	40	12/21/2013	8279	8497	SLK Wtr	4676	Sand	375740	85
17	12/21/2013	8008	8225	40	12/21/2013	8008	8225	SLK Wtr	4805	Sand	378885	86
18	12/27/2013	7736	7954	40	12/27/2013	7736	7954	SLK Wtr	4892	Sand	375700	84
19	12/27/2013	7465	7682	40	12/27/2013	7465	7682	SLK Wtr	5471	Sand	374940	85
20	12/27/2013	7193	7411	40	12/27/2013	7193	7411	SLK Wtr	4917	Sand	374460	86
21	12/27/2013	6922	7139	40	12/27/2013	6922	7139	SLK Wtr	4907	Sand	376160	85
22	12/28/2013	6650	6868	40	12/28/2013	6650	6868	SLK Wtr	4844	Sand	374900	85

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